



الإدارة المركزية للرعاية الصيدلانية
الإدارة العامة للممارسات الدوائية و الصيدلانية

Pharmacy Practice Newsletter

“Know what’s new... Optimize care”

Prepared by

Dr. Yasmin Yehia
Dr. Lamis Diaa
Dr. Lobna Sami

Designed by:

Dr. Lamis Diaa

Reviewed by

Dr. Hebatullah Abdulaziz
Manager of Clinical
Pharmacy Practice
Administration
& Drug Information
Administration
Chief Editor

Dr. Abeer Elbehairy
General Manager
Drug Utilization
& Pharmacy Practice G.A

Under Supervision of

Dr. Shereen Abd-Elgawad

Head of Central
Administration of
Pharmaceutical Care

Introduction

The Central Administration of Pharmaceutical Care in the Egyptian Drug Authority is keenly interested in upgrading the pharmaceutical services provided to the patients and boosting the pharmacotherapy-related knowledge of all healthcare providers, which will positively impact the patient’s health and safety.

From this point, the General Administration of Drug Utilization and Pharmacy Practice (DU&PP) is pleased to publish the *Pharmacy Practice Newsletters*, which aims to aid practitioners in their mission to optimize care. Topics related to pharmacotherapy and pharmacy practice will be addressed in our newsletter. The newsletter will provide an up-to-date, concise summary that fits perfectly into the healthcare provider’s tight schedule.

We utilize accredited resources and indexed journals integrating the best available research into clinical care, to support the decision-making process for healthcare professionals. To optimize patients’ treatment plans and ensure their safety and efficacy, clinicians must closely follow the literature for any updates related to their practice, given the dynamic nature of the clinical research.

VOLUME 1, ISSUE 3, November 2024

Inside this issue



EDA
Publications
EDA Diabetes
Guide to Good
Pharmacy
Practice (2024)

Page 1



Clinical
Pharmacy Tips
Perioperative
Management of
Diabetes Medications

Page 2



DU&PP News
Three
Pharmaceutical
Care Initiatives
(July)

Page 6

EDA Publications: EDA Diabetes Guide to Good Pharmacy Practice (2024)

The Clinical Pharmacy Team within the Drug Utilization and Pharmacy Practice Administration has issued the 'EDA Diabetes Guide to Good Pharmacy Practice' guide. The guide comes as a part of the EDA's relentless efforts to standardize the pharmacy practice and uplift the pharmacists' skills. It comes in collaboration with several stakeholders represented in the Pharmacy Practice Guides and National Drug Lists Committee, which has rigorously reviewed this guide.

Aim of the guide:

- Provide a comprehensive guide for pharmacists to ensure the delivery of optimum level of care for diabetic patients and promote good pharmacy practice.
- Support pharmacists, regardless of their settings, in making informed recommendations based on the most accurate and updated sources of information.
- Equip the pharmacists, especially community pharmacists, with patient education materials and illustrations to facilitate the counseling process and ensure patient safety and welfare.

Introduction:

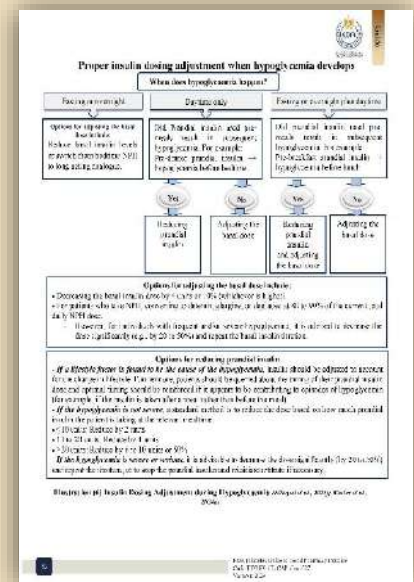
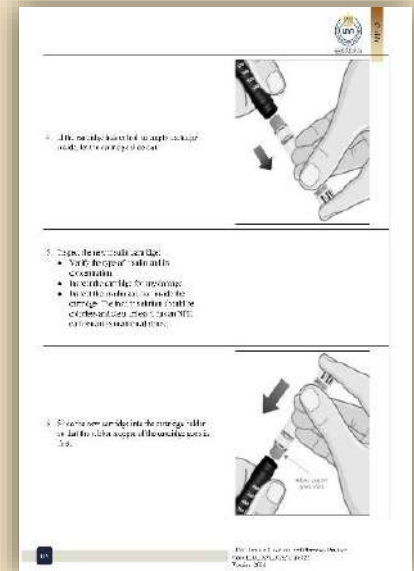
Diabetes Mellitus is one of the most prevalent diseases in Egypt. According to World Bank statistics in 2021, 20.9 % of the Egyptian population suffers from diabetes mellitus. We target pharmacists, in inpatient and outpatient settings, being in a unique position to provide significant patient care services to diabetic patients. Increasing the integration of pharmacists into interdisciplinary, collaborative teams focused on improving the services and avoiding inappropriate use of medication provides a significant opportunity to promote care value. This has drawn attention to the need for a comprehensive guide to good pharmacy practice when dealing with diabetic patients.

Content of the guide:

In this guide, you will find clear information about diabetes prevention and achieving glycemic control and target levels by non-pharmacologic and pharmacologic approaches. The pharmacologic approach for diabetes type 1 and 2 is discussed in full detail in the management approach sections. These sections also consider any modifications in case of special scenarios (e.g. elderly patients, and perioperative management). Furthermore, the guide provides an overview of the available antidiabetic medications in the Egyptian market - including injectable and oral. It also briefly addresses the most common complications with diabetes mellitus and their treatment.

It is worth mentioning that the guide contains several *illustrations, algorithms and printable educational materials* for patients and healthcare professionals, which pharmacists can readily use to deliver their counseling points and educational programs.

Where to find the guide:



The 'EDA Diabetes Guide to Good Pharmacy Practice' is published on the EDA official website and can be accessed via this [LINK](#) or the QR Code.

Clinical Pharmacy Tips: Perioperative Management of Medications for Diabetes

Introduction:

- An estimated 20% of patients undergoing general surgery may have diabetes, and between 23 and 60% may have prediabetes or diabetes that is not yet recognized.
- The risks of hyperglycemia, death, infection, and length of stay are all increased by surgical stress and the release of counter regulatory hormones.
- Few data are available to help manage diabetic patients’ medications during the perioperative phase in order to lower the risks associated with surgery. So, we will display a simple comparison between some international organizations’ guidelines in this issue as a guide to proper management.
- It is worth mentioning that this should only be used as a guidance after referral to your existent institution’s policies and having it discussed in the *Pharmacy and Therapeutics Committee* at your institution to assess the feasibility of its implementation and tailor the recommendations based on your institution’s situation.

Before elective surgery, if patient on	Centre for Perioperative Care (CPOC) 2023	The Association of Anesthetists of Great Britain and Ireland (AAGBI) 2015	American Diabetes Association (ADA) 2024 & related references
Insulin: Resume taking usual insulin the morning after surgery. However, blood glucose levels may be higher than usual for a day or so.			
Once daily long-acting insulin (morning dose)	<ul style="list-style-type: none"> • Day before surgery: Normal dose • Day of surgery: Give 80% of dose and check blood glucose level (BGL) 	<ul style="list-style-type: none"> • Day before surgery: Reduce dose by 20% • Day of surgery (am/pm): Reduce dose by 20%, check BGL 	<ul style="list-style-type: none"> • Day of surgery (morning): Give 75 - 80% of normal dose
Once daily long-acting insulin (lunchtime dose)	<ul style="list-style-type: none"> • Day before surgery: Give 80% of dose • Day of surgery: Restart insulin at normal dose once eating and drinking 	<ul style="list-style-type: none"> • No data 	<ul style="list-style-type: none"> • No data
Once daily long-acting insulin (evening dose)	<ul style="list-style-type: none"> • Day before surgery: Give 80% of dose • Day of surgery: No adjustment required 	<ul style="list-style-type: none"> • Day before surgery: Reduce dose by 20% • Day of surgery (am/pm): Check BGL on admission. 	<ul style="list-style-type: none"> • Day before surgery (evening): A reduction by 25% of basal insulin given
Twice daily long-acting insulin	<ul style="list-style-type: none"> • Day before surgery: <ul style="list-style-type: none"> - <i>Morning dose:</i> No change - <i>Evening dose:</i> Give 80% of dose • Day of surgery: <ul style="list-style-type: none"> - <i>Morning dose:</i> Give 80% of dose and check BGL - <i>Evening dose:</i> Unchanged 	<ul style="list-style-type: none"> • Day before surgery: No change. • Day of surgery (am/pm): <ul style="list-style-type: none"> - <i>Morning dose:</i> Give 50% of the dose - <i>Evening dose:</i> Unchanged. - Check BGL on admission 	<ul style="list-style-type: none"> • Evening before surgery: A reduction by 25% of basal insulin given • Morning of surgery: A reduction by 25% of basal insulin given

<p>Twice daily premixed/ biphasic insulin</p>	<ul style="list-style-type: none"> • Day before surgery: No adjustment required • Day of surgery: <ul style="list-style-type: none"> - <i>Morning dose:</i> Give 50% of usual dose. Check BGL - <i>Evening dose:</i> Resume usual insulin with evening meal if eating a normal meal. If eating a half/small meal give half usual dose. If not eating give basal only component of the usual mixed insulin 	<ul style="list-style-type: none"> • Day before surgery: No change. • Day of surgery (am/pm): <ul style="list-style-type: none"> - <i>Morning dose:</i> Give 50% of the dose - <i>Evening dose:</i> Unchanged. - Check BGL on admission. 	<ul style="list-style-type: none"> • No data
<p>Twice daily: Two different types of insulin (short-acting and intermediate-acting) combined by the patient into one injection or given by separate injections</p>	<ul style="list-style-type: none"> • Day before surgery: No adjustment required. • Day of surgery: <ul style="list-style-type: none"> - <i>Morning dose:</i> Calculate the total dose of both morning insulins and give 50% of total dose as intermediate acting insulin only. Check BGL • <i>Evening dose:</i> Similar to twice daily premixed insulin 	<ul style="list-style-type: none"> • Day before surgery: No dose change. • Day of surgery (am/pm): <ul style="list-style-type: none"> - Calculate total dose of morning insulin(s); give half as intermediate-acting only in the morning; - Check BGL on admission; • Leave evening meal dose unchanged 	<p>NPH Component:</p> <ul style="list-style-type: none"> • Evening before surgery: reduce dose by 20% • Morning of surgery: Give 50% of usual dose of NPH
<p>Three to five injections daily (Premixed or basal-bolus)</p>	<p style="text-align: center;"><u>Premixed insulin</u></p> <ul style="list-style-type: none"> • Day before surgery: No adjustment required • Day of surgery: <ul style="list-style-type: none"> - <i>Morning dose:</i> Similar to twice daily premixed insulin - <i>Lunchtime dose:</i> Omit - <i>Evening dose:</i> Similar to twice daily premixed insulin 	<ul style="list-style-type: none"> • Day before surgery: No dose change. • Day of surgery: <p><u>If am surgery:</u></p> <ul style="list-style-type: none"> - Basal bolus regimens: Basal: Keep unchanged. Bolus: Omit morning and lunchtime short-acting insulins. - Premixed morning insulin: Halve morning dose, and Omit lunchtime dose, Check BGL on admission <p><u>If pm surgery:</u></p> <ul style="list-style-type: none"> Give usual morning insulin dose(s); Omit lunchtime dose; Check BGL on admission. 	<ul style="list-style-type: none"> • No data

<p>Short-acting insulin with meals (two to four doses a day)</p>	<ul style="list-style-type: none"> • Day before surgery: No adjustment required. <p><u>If morning surgery:</u></p> <ul style="list-style-type: none"> - Omit dose if no meal eaten and drinking normally. Check BGL on admission. - Resume normal insulin with evening meal: Similar to twice daily premixed insulin <p><u>If afternoon surgery:</u></p> <ul style="list-style-type: none"> - Take usual morning insulin dose with breakfast. - Omit lunchtime dose if not eating. Check BGL - Resume normal insulin with evening meal: Similar to twice daily premixed insulin 	<ul style="list-style-type: none"> • No data 	<ul style="list-style-type: none"> • No data
<p>Other Antidiabetic Medications</p>			
<p>Metformin</p>	<p><u>If eGFR >60 ml/min/1.73m² OR procedure NOT requiring use of contrast media:</u></p> <ul style="list-style-type: none"> • Day before surgery: Take as normal. • Day of surgery: - If once or twice dosing, take as normal. - If three times dosing, omit lunchtime dose. <p><u>If eGFR < 60ml/min/1.73m² OR contrast medium is to be used:</u></p> <ul style="list-style-type: none"> • Metformin should be omitted on the day of the procedure and for the following 48 hours. 	<p><u>If eGFR >60 ml/min/1.73m² OR procedure NOT requiring use of contrast media:</u></p> <ul style="list-style-type: none"> • Day before surgery: Take as normal. • Day of surgery: Take as normal. <p><u>If eGFR < 60ml/min/1.73m² OR contrast medium is to be used:</u></p> <ul style="list-style-type: none"> • Metformin should be omitted on the day of the procedure and for the following 48 hours. 	<ul style="list-style-type: none"> • Day of surgery: Withhold on the day of scheduled surgery
<p>Sulphonylurea</p>	<ul style="list-style-type: none"> • Day before surgery: Take as normal. • Day of surgery: <p><u>If morning surgery:</u></p> <ul style="list-style-type: none"> • Once daily: Omit the morning dose. • Twice daily: Omit the morning dose. Take evening dose if eating. <p><u>If afternoon surgery:</u></p> <ul style="list-style-type: none"> • Do not take on day of surgery (omit both doses) 	<ul style="list-style-type: none"> • Similar to (CPOC) recommendations 	<ul style="list-style-type: none"> • Day of surgery: Withhold on the morning of scheduled surgery

<p>Meglitinide</p>	<ul style="list-style-type: none"> • Day before surgery: Take as normal • Day of surgery: <u>If morning surgery:</u> Omit morning dose if not eating. <u>If afternoon surgery:</u> Give morning dose if eating. 	<ul style="list-style-type: none"> • Similar to (CPOC) recommendations 	<ul style="list-style-type: none"> • Day of surgery: Withhold on the morning of scheduled surgery
<p>Pioglitazone</p>	<ul style="list-style-type: none"> • Day before surgery/ day of surgery: Take as normal 	<ul style="list-style-type: none"> • Similar to (CPOC) recommendations 	<ul style="list-style-type: none"> • Day of surgery: Withhold on the morning of surgery
<p>Dipeptidyl peptidase-4 (DPP-4) inhibitors</p>	<ul style="list-style-type: none"> • Day before surgery/ day of surgery: Take as normal 	<ul style="list-style-type: none"> • Similar to (CPOC) recommendations 	<ul style="list-style-type: none"> • Day of surgery: Withhold on the morning of scheduled surgery
<p>Sodium-glucose cotransporter 2 (SGLT-2) inhibitors</p>	<ul style="list-style-type: none"> • Day before surgery: Omit • Day of surgery: Omit - Check capillary blood ketones daily - Treatment may be restarted once ketone levels are normal and the person with diabetes condition has stabilized, and normal oral intake is established 	<ul style="list-style-type: none"> • Day before surgery: Take as normal • Day of surgery: Do not take on day of surgery 	<ul style="list-style-type: none"> • Discontinue 3-4 days before surgery
<p>Acarbose</p>	<ul style="list-style-type: none"> • Day before surgery: Take as normal • Day of surgery: <u>If morning surgery:</u> Omit morning dose if not eating <u>If pm surgery:</u> Give morning dose if eating 	<ul style="list-style-type: none"> • Similar to (CPOC) recommendations 	<ul style="list-style-type: none"> • Day of surgery: Withhold on the morning of scheduled surgery
<p>Glucagon-like peptide 1 receptor agonist (GLP-1RA)</p>	<ul style="list-style-type: none"> • Day before surgery: Take as normal • Day of surgery: Take as normal, however prudent precautions should be undertaken to avoid pulmonary aspiration. More caution may be required for certain types of anesthesia. 	<ul style="list-style-type: none"> • Day before surgery: Take as normal • Day of surgery: Take as normal 	<ul style="list-style-type: none"> • There are little data • Day of surgery: Withhold on the morning of scheduled surgery for daily dose or withhold once-weekly dose for a week prior to surgery.

DU&PP News: Three Pharmaceutical Care Initiatives (July Digest)

The Egyptian Drug Authority launched the activities of three Pharmaceutical Care Initiatives in Pharmacy Practice through July 2024 under supervision & by the team of the Drug Utilization and Pharmacy Practice Administration, as follow;

1) Experience Exchange Hub at EDA under the title (*Triple E's Hub*):

The goal of Triple E's Hub is to support relentless efforts made at the national level to achieve a comprehensive approach to disseminating and circulating the best pharmaceutical practices in health institutions in the Arab Republic of Egypt based on the EDA vision and Egypt Vision 2030, to build and revitalize the partnerships for sustainable development.

The 5th scientific meeting was held on July 2024 for 32 hospital and clinical pharmacists in lung cancer management – oncology pharmacy approach through providing different educational case studies, this comes within the efforts made by the EDA to improve and sustain pharmaceutical practices and services provided, in addition to optimal and rational use of medications.

The Triple Es Hub strategy is adopting the necessity of experience exchange in Pharmaceutical Practices, through health institutions participation from different affiliations and governorates (governmental and private) who attend regular scientific meetings and present relevant educational case studies with a clinical intervention that is recommended by a clinical pharmacist in communicable and non-communicable diseases. In addition to effective discussion among pharmacists, also with academic staff and experts in pharmacy from leading health institutions in Egypt.



DU&PP News: Three Pharmaceutical Care Initiatives (Cont.)

2) (Safe Medication.....Save Life) Initiative:

The initiative's goal to spread awareness among various members of society regarding the safe and effective use of medications in line with the Society Engagement Approach and Egypt Vision 2030, to build healthy and aware communities and to obtain the maximum therapeutic benefits, through discussing the use of medications on multiple topics related to non-communicable diseases, such as diabetes, hypertension diseases, chest disease, use of inhalers, use of analgesics, and cancer medications side effects. In addition to awareness about antimicrobials rational use.

The on-site awareness campaigns are scheduled to target public places, such as cultural centers and palaces, public libraries, sports clubs, outpatient clinics in hospitals, community service centers in universities, or other public places in the Egyptian governorates.

Community awareness sessions witnessed fruitful discussions among society members, that were held at Heliopolis Culture Palace and Al-Bahr Al-Azzam Public Library, for several visitors including women, adults, and children. This comes within the efforts made by the EDA to improve and sustain drug awareness and pharmaceutical services provided throughout the Arab Republic of Egypt and its constant keenness to promote the optimal and rational use of medications.



DU&PP News: Three Pharmaceutical Care Initiatives (Cont.)

3) (Unlock the Pharmacist Potential) Initiative:

The initiative aims to encourage and sustain the right and optimal pharmaceutical practices and achieve continuing professional development and supporting. It is launched based on the EDA vision and its role in Capacity Building and Continuing Development Strategy in line with Egypt Vision 2030.

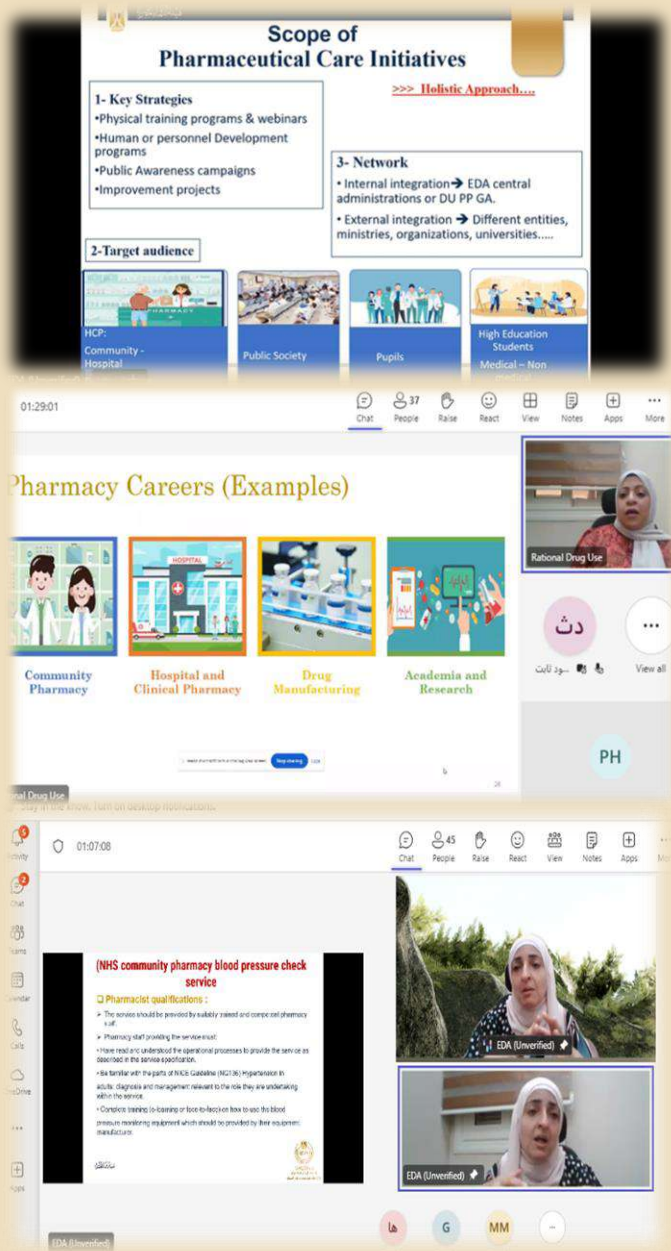
The initiative scope is the community pharmacists who are the first line of defense in society and capable of making a positive impact.

The training programs consist of a series of monthly virtual lectures (online webinars) hosted by the General Administration of Drug and Pharmacy Practices team. These sessions may feature contributions from professional experts and academic professors across various fields of practice.

Selected topics include:

- Patient education and counseling
- Medications for non-communicable chronic chest diseases
- Management of cardiovascular diseases, diabetes, and liver diseases
- Medication considerations during Ramadan
- Drug use and interaction management
- Antimicrobial and analgesic use
- Managing side effects from oncology medications
- Additional relevant topics

This comprehensive approach ensures participants receive up-to-date knowledge and best practices in the field.





وبيينار

وبيينار تدريبي عن التوعية والتثقيف الدوائي لمرضى القلب وضغط الدم المرتفع

من ٢:٠٠ ظهراً إلى ٤:٠٠ عصرًا

الأربعاء ٢٠٢٤ يوليو ٢٤

مقدم لصياغة المجتمع الإلكترونية





وبيينار

وبيينار عن مبادئ التثقيف الدوائي ومهارات التوعية الدوائية

من ١٠:٠٠ صباحاً إلى ١٢:٠٠ ظهراً

الأربعاء ٢٠٢٤ يوليو ٢٤

مقدم لصياغة المجتمع الإلكترونية



About DU&PP

The Drug Utilization and Pharmacy and Pharmacy Practice General Administration (DU&PP) is concerned with rationalizing medication use and reducing medication errors. The General Administration is also concerned with developing pharmaceutical practices, enhancing Egyptian pharmacists' skills, issuing pharmacy practice guidance, preparing national drug lists and the Egyptian drug formulary, and providing numerous training programs. It also aims to raise community awareness and promote the safe and effective use of medications by conducting awareness campaigns and pharmaceutical care initiatives among all segments of society to ensure patient safety and achieve optimal drug use.

Our publications, including clinical practice guides, newsletters and the Egyptian National Formulary, are available at the official EDA website and can be accessed via the following hyperlinks or QR codes:



References

- https://diabetesjournals.org/care/article/47/Supplement_1/S295/153950/16-Diabetes-Care-in-the-Hospital-Standards-of-Care
- <https://www.bjanaesthesia.org/action/showPdf?pii=S0007-0912%2823%2900128-9>
- <https://www.cpoc.org.uk/sites/cpoc/files/documents/2024-05/CPOC-DiabetesGuideline2023.pdf>
- https://anaesthetists.org/Portals/0/PDFs/Guidelines%20PDFs/Correction_Perioperative_management_of_the_surgical_patient_with_diabetes.pdf?ver=2019-05-05-074447-837
- <https://www.asahq.org/about-as/newsroom/news-releases/2023/06/american-society-of-anesthesiologists-consensus-based-guidance-on-preoperative>
- <https://pubs.asahq.org/anesthesiology/article/126/3/547/19751/Perioperative-Hyperglycemia-ManagementAn-Update>
- <https://www.ncbi.nlm.nih.gov/books/NBK540965/>
- https://anaesthetists.org/Portals/0/PDFs/Guidelines%20PDFs/Guideline_perioperative_management_surgical_patient_diabetes_2015_final.pdf?ver=2018-07-11-163756-413&ver=2018-07-11-163756-413

Egyptian Drug Authority

Central Administration of Pharmaceutical Care

General Administration of Drug Utilization and Pharmacy Practice

	21 Abd El-Aziz Al Soud Street, Manial El-Roda, Cairo, Egypt		pp.rdu@edaegypt.gov.eg
	+202 – 25354100, Ext:1902		https://www.edaegypt.gov.eg/
	+202 – 23684194		https://www.facebook.com/egyptiandrugauthority